



Percent Report

Sample IO: 01402018 (initiated 1/15/99 7:03am) BASELINE CORRECTED Turntable Position: e c Sampling Interval: 1.0 sec Data Start 3.00 min Samples In Run Data Duration : 16.00 min Operator ID Peak Ht Thrashold : 3000 uAU Int. Std. Amt : 250 pmol Calibration File : 14JANCAL (initiated 1/15/99 9:44am) Reference Time : 0.00 min (No ISTD Peak Specified)

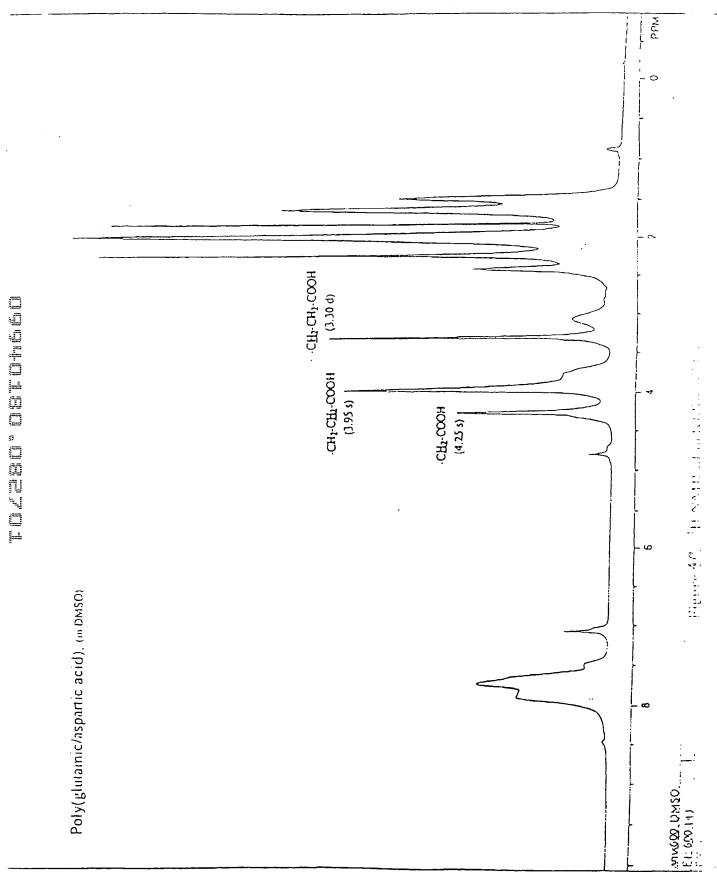
Reference Offset 1: -0.02 min Reference Offset Z: 0.00 min

Integration Interval: 0.0 to 16.0 min

PEAK ID	RET. TIME Min	HEIGHT BY	FMOL correc. INT STO	MOL Z	
ASX	2.30	562.99	0.00	29.02	
GLX	2.70	1377.05	0.00	70.98	
TOTAL PHOLS RE	COVERED	1940.04			
Minimum Peak 1	inreshold:	3000 uAU	s peaks below S peaks found)
			peaks match)

Figure 1B.

Amino acid analysis of the polypeptide



11:05



Pt(II) Complex

Pt(IV) Complex

Figure 2.

Structures of platinum(II) and platinum(IV)-poly(dipeptide) complexes

M d



1000

Galbraith Laboratories, Inc.

Accuracy with Speed - Since 1950

LABORATORY REPORT

SAMPLE ID	LAB ID	RESULT(S)		
DACH	1-5746	Plannum	44,60	9.4
PPAP	1-5747	Platinum	16.11	Ÿ. o
PDDP	1-5748	Platinum	1764	٥, ،

Figure 3 Elemental analysis of platinum-poly(dipeptide) complexes for Pt(II)(PDDP), Pt(IV)(PPAP) and cis-1,2-DACH-Pt SO₄(DACH)

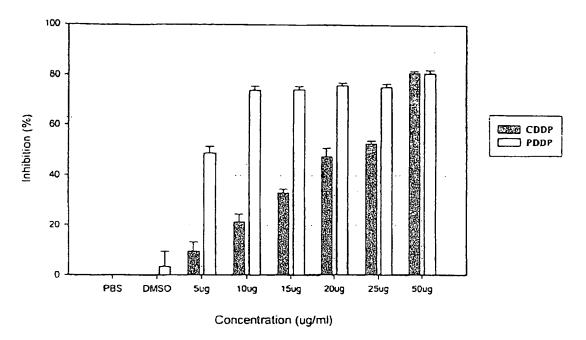
this report shall not be reproduced, except in full, without the written approved of the laborators

P.O. Box 51610, Knoxville, TN 37950-1610 • 2323 Sycamore Drive, Knoxville, TN 37921-1700 Toll-Free, 677-445-8797 • Tel: 865-546-1335 • Fax: 865-546-7209 internet; http://www.galbraith.com • Email: labinfo@galbraith.com

Inventor: William W. Zuo, et al. Title: "Anticancer Polypeptide-Metal Complexes and Compositions, Methods of Making, and Methods of Using Same" Agent: Mary A. Gilbreth, Ph.D. Reg No. 45,775 Atty Docket: 27300/03 Express Mail No. EL 872 048 512 US 4/10

747-3:3

Effect of PDDP & CDDP on Inhibition of Human Sarcoma Cells (HT1080) at 48 Hours



Effect of PDDP & CDDP on Inhibition of Human Sarcoma Cells (HT1080) at 72 Hours

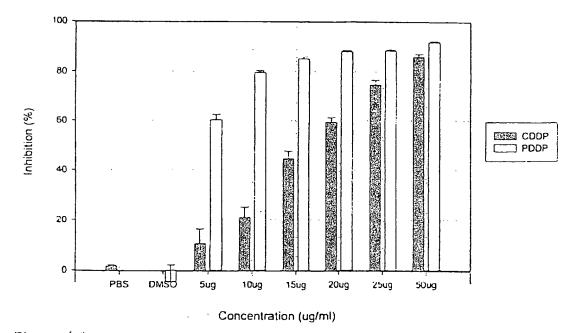
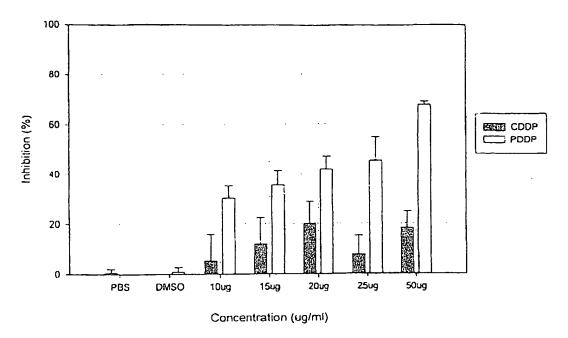


Figure 4/4
In vitro cell culture assay of cisplatin(CDDP) and poly(glutamate/aspartate) acid-1,2-DACH-Pt(II) complex(PDDP) in human sarcoma

Inventor: William W. Zuo, et al. Title: "Anticancer Polypeptide-Metal Complexes and Compositions, Methods of Making, and Methods of Using Same" Agent: Mary A. Gilbreth, Ph.D. Reg No. 45,775 Atty Docket: 27300/03

æ

Effect of PDDP & CDDP on Inhibition of Human Prostate Cancer Cells (A10) at 48 Hours



Concentration (ug/ml)

Concentration (ug/ml)

Figure 100

Concentration (ug/ml)

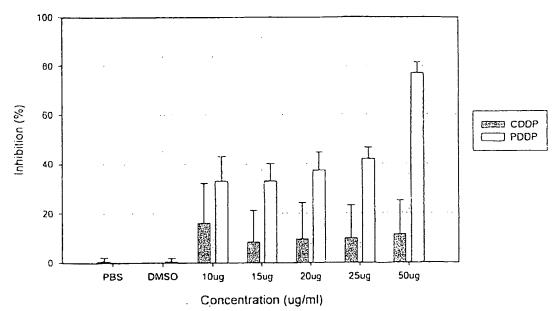
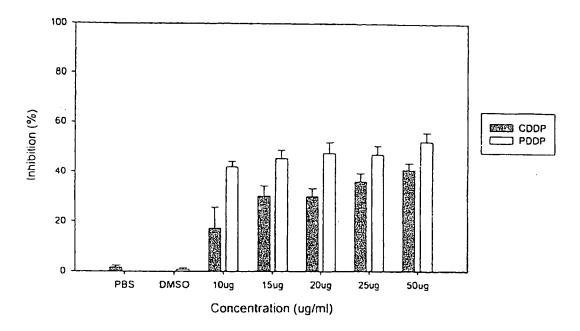


Figure 4-6
In vitro cell culture assay of cisplatin(CDDP) and poly(glutamate/aspartate) acid-1,2-DACH-Pt(II) complex(PDDP) in human prostate cancer

Effect of PDDP & CDDP on Inhibition of Human Prostate Cancer Cells (PC3) at 48 Hours



Effect of PDDP & CDDP on Inhibition of Human Prostate Cancer Cells (PC3) at 96 Hours

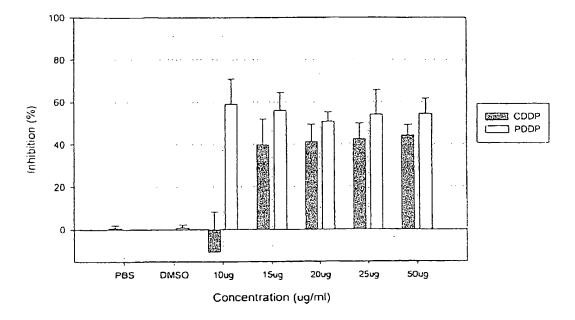
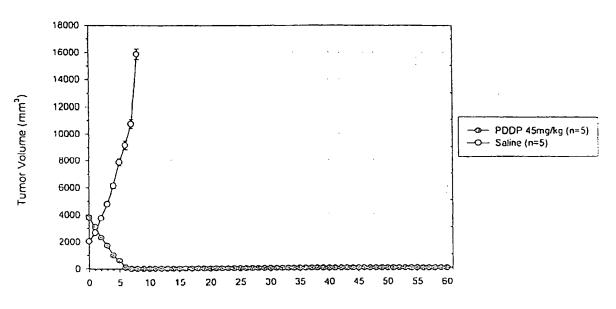


Figure 5C

In vitro cell culture assay of cisplatin(CDDP) and poly(glutamate/aspartate) acid-1,2-DACH-Pt(II) complex(PDDP) in human prostate cancer

Anti-tumor Activity of PDDP Against Rats Bearing Breast Tumors (13762)



Days after Treatment (single injection, i.v.)

Figure 5 In vivo anti-tumor activity of an inventive poly(glutamate/aspartate) acid-1,2-DACH-Pt(II) complex (PDDP) compared to control against rats bearing breast tumors.

(3<u>35)</u> 747-J58:

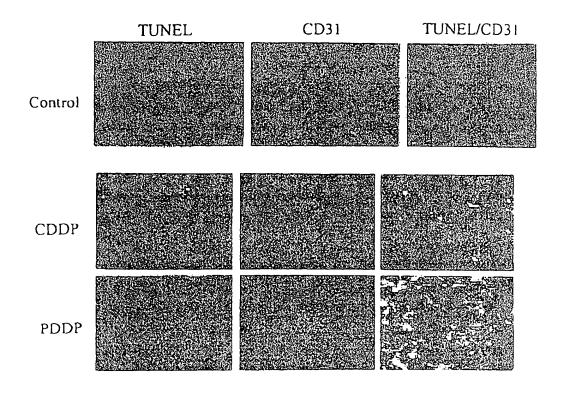


Figure 6

The specific cellular target expression changes at 48 hours post treatment of poly(glutamate/aspartate) acid-1,2-DACH-Pt(II) complex (PDDP), cisplatin (CDDP) and saline (control)

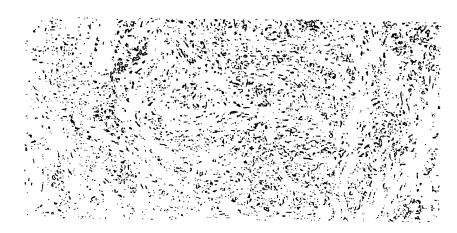
Agent: Mary A. Gilbreth, Ph.D. Reg No. 45,775

Atty Docket: 27300/03

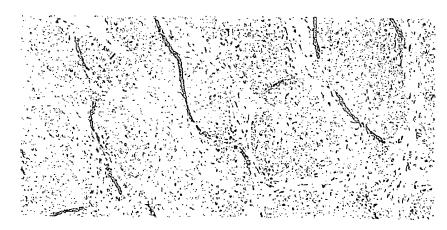
Express Mail No. EL 872 048 512 US



Histopathological slide of the breast tumor (13762) at 48 hours post treatment of PDDP



Histopathological slide of the breast tumor (13762) at 48 hours post treatment of CDDP



Histopathological slide of the breast tumor (13762) at 48 hours post treatment of Saline

Ligure 7

The histopathological changes of breast tumors (13762) at 48 hours post treatment of poly(glutamate/aspartate) acid-1.2-DACH-Pt(II) complex (PDDP), cisplatin (CDDP) and Saline

> Inventor: William W. Zuo, et al. Title: "Anticancer Polypeptide-Metal Complexes and Compositions, Methods of Making, and Methods of Using Same"
> Agent: Mary A. Gilbreth, Ph.D. Reg No. 45,775
> Atty Docket: 27300/03
> Express Mail No. EL 872 048 512 US